

# United States Air Force Aircraft Accident Investigation Board Report

## EXECUTIVE SUMMARY

### AIRCRAFT ACCIDENT INVESTIGATION

T-38C, SERIAL NUMBER (S/N) 64-3231

90TH FLYING TRAINING SQUADRON (FTS), SHEPPARD AIR FORCE BASE (AFB), TEXAS

1 MAY 2008

On 1 May 2008, at 0752 Local Time (L), the Mishap Aircraft (MA), a T-38C Talon, S/N 64-3231, crashed approximately 6800 feet down the runway between runways 15C and 15R at Sheppard AFB, Texas (TX). The MA, assigned to the 90 FTS, 80th Operations Group (80 OG), 80th Flying Training Wing (80 FTW), was on a student training sortie. The Mishap Crew (MC), consisting of a Mishap Instructor Pilot (MIP) assigned to the 90 FTS and a Mishap Student Pilot (MSP) assigned to the 80th Operations Support Squadron (80 OSS), were fatally injured in the mishap.

The MSP flew a simulated single engine heavyweight (full fuel load) approach with an alternate gear extension without the Heads Up Display (HUD) for a planned touch and go to runway 15C. At or near the time the MA touched down, the MIP took control of the aircraft because the aircraft was outside the parameters for a successful landing on the main runway surface. The MA made a firm landing in the overrun, throwing debris from the overrun surface into the number 2 (right) engine intake resulting in compressor stall two seconds after touchdown and complete engine seizure four seconds after touchdown.

Eight seconds after the right engine failed, while climbing away from the ground the MIP retracted the landing gear and flaps. Eleven seconds after the engine failed, the MIP selected maximum power (MAX) on the left engine. The proper procedure following an engine failure during either the takeoff or landing phase is to immediately select MAX power, set flaps to 60 percent and attain safe flying airspeed. The lack of power and airspeed, and the MIP's failure to leave the flaps positioned at 60 percent, resulted in a high angle of attack and subsequent stall. The MC ejected 24 seconds after engine failure.

At the time of ejection, the aircraft was 5-10 degrees nose low, 25-40 feet above the ground and in a fully developed stall. The near simultaneous ejection of the MC caused contact between the two ejection seats, disrupted their trajectories, and resulted in an unsuccessful ejection sequence. Both pilots were fatally injured upon impacting the ground. The aircraft was damaged beyond repair with a loss of \$8,507,567.01. No private property was damaged.

Clear and convincing evidence reveals that the cause of this accident was the MIP's failure to execute the critical emergency procedures upon right engine failure two seconds after touching down in the overrun.

Under 10 U.S.C. 2254(d) any opinion of the accident investigators as to the cause of, or the factors contributing to, the accident set forth in the accident investigation report may not be considered as evidence in any civil or criminal proceeding arising from the accident, nor may such information be considered an admission of liability of the United States or by any person referred to in those conclusions or statements.

T38-C, 64-3231, 1 May 2008